UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
REGION VIII
999 18th STREET - SUITE 500
DENVER, COLORADO 80202-2466

7295

322501

AUG 25 1992

Ref: 8HMW-SR

MEMORANDUM

FILE PLAN
1.07

TO: File

FROM: Michael McCeney, RPM
Superfund Remedial Branch

Mike Zimmerman, OSC
Emergency Response Branch

SUBJECT: Richardson Flat Tailings Site Visit, August 4-6, 1992

Purpose

On August 4-6, 1992 representatives from EPA and EPA's technical assistance team of Ecology and Environment, Inc. (TAT) conducted sampling at the Richardson Flat Tailings Site in Summit County Utah (the Site). The purpose of this sampling was to assess the need for possible removal or site stabilization at the Site. During this activity, observations were made on behalf of EPA's site assessment program to attempt to resolve issues associated with the Hazard Ranking System Scoring Package (HRS package) for the Site. This memo provides a report of the those observations.

Participants in Observations Pertaining to the HRS Issue

Representing EPA:
Michael McCeney, Remedial Project Manager
Mike Zimmerman, On-Scene Coordinator

Members of EPA's TAT:
Scott Keen, Environmental Scientist
Katherine Romine, Chemical Engineer

Representing United Park City Mines (UPCM):
Ed Osika, Ed. VP
Dave Tuesday, Pioneer Consulting

Observations

Observations made which specifically pertained to the HRS package were of the main slurry line crossing of the diversion ditch. This area was the subject of a memo to

the site file from Mo Slam and Jason Knowlton of Utah Department of Health (UDOH) dated July 6, 1990. This memo was referenced in the HRS package.

After concluding sampling activities for the day on August 5, McCeney, Zimmerman, and Osika inspected the site of the main slurry line crossing of the diversion ditch. McCeney asked Osika to explain the points of contention which had arisen as a result of UDOH's memo. According to Osika, UDOH had erroneously characterized the materials used to construct the slurry line crossing as tailings. According to Osika, UDOH thereby drew the conclusion that they had observed sloughing of tailings into the diversion ditch. McCeney and Zimmerman observed that the slurry line crossing was constructed out of a granular, sandy soil of larger particle size than typical tailings material found at the Site. The material did not appear to be tailings, rather a silica sand. Comparison of "photo #2 " of the UDOH memo to the existing crossing revealed that the condition of the crossing was essentially unchanged since the time of the 1990 photo.

According to Osika, UDOH also erroneously graphically depicted the location of RFT-TA3 [a soil sample collected by EPA's FIT team in 1989 and used in the Supplemental Site Inspection Report for the Site dated December 20, 1989 (SSI)] as being immediately adjacent to the location of "photo #2" (see Figure 1). Osika directed Zimmerman and McCeney to what he believed to be the location of RFT-TA3. Upon inspection of the RFT-TA3 photo, (published in the 1989 SSI) McCeney and Zimmerman observed that Osika's location of the sample appeared accurate to within 10 feet. McCeney estimated (by pacing) that Osika's location RFT-TA3 was approximately 400 feet south easterly of the slurry line crossing and UDOH's depiction of the RFT-TA3 location (see Figure 1). Osika acknowledged that the material present in the vicinity of the apparent location of RFT-TA3 was tailings.

McCeney asked Osika if he would object to the TAT team collecting soil samples from the crossing location for laboratory metals analysis. McCeney indicated to Osika that results of the sampling could possibly be used by EPA to address UPCM's comments to the proposed HRS package. Osika indicated that he did not see a problem with sampling however he expressed concern over the fact that the sampling would be beyond the scope of the approved sampling plan for this site visit. McCeney indicated that the sampling plan provided for opportunity samples and that with his permission, samples would be collected on 8/6.

On 8/6 McCeney, Zimmerman, Osika, Keen, Romine, and Tuesday went to the crossing location to stake proposed sample locations. Two of three proposed locations (on the ditch banks) were staked as indicated in photos 1 and 2. A third sample was to be taken from the shoulder of the crossing. Osika indicated that he had conferred with his legal counsel the previous night over whether or not UPCM would allow for samples to be taken. He indicated that he was awaiting a response from counsel to be provided later in the day. McCeney asked Osika if he would object to the TAT making XRF measurements near the staked locations using the field portable X-Met X-ray Fluorescent (XRF) instrument. McCeney assured Osika that EPA would not use the results of the XRF measuring to address comments to the HRS package. This was because, as had been previously explained to Osika, the instrument was not calibrated to provide absolute quantitative lead concentrations. Osika granted permission and observed the XRF

measuring. The first XRF measurement, number RF 051, was taken from the northwest shoulder of the slurry pipe support (see photo #1). The XRF "shot" was taken on the surface, in-situ, at 1433 hrs. The surface material was what appeared to be silica sand. The XRF reading for RF 051 was 1.5 parts per million (ppm) total relative lead concentration (because the x-met was not calibrated to the Site soils, only relative total lead concentrations were measured) (see photo #1). A second measurement was taken, number RF 052, at a location immediate adjacent to RF 051. The "shot" was also taken on the surface, in-situ, at 1435 hrs. The XRF reading for RF 052 was 0.0 ppm. A third reading was taken, RF 053, at a location approximately four feet north of standing water on the bank of the diversion ditch (see photo #2). The soil at this location was a dark loam to coarse clay material and appeared to be a native soil. It did not exhibit typical physical characteristics of mill tailings. The "shot" was taken approximately 2" below the ground surface, in situ, at 1437 hrs. The XRF reading for RF 053 was 6326 ppm. A fourth reading was taken, RF 054, of a lead calibration standard of known total lead concentration equal to 1000 ppm. RF 054 was taken at 1440 hrs. The reading for RF 054 was 1122 ppm. All XRF measurements were made by Katherine Romine of the TAT.

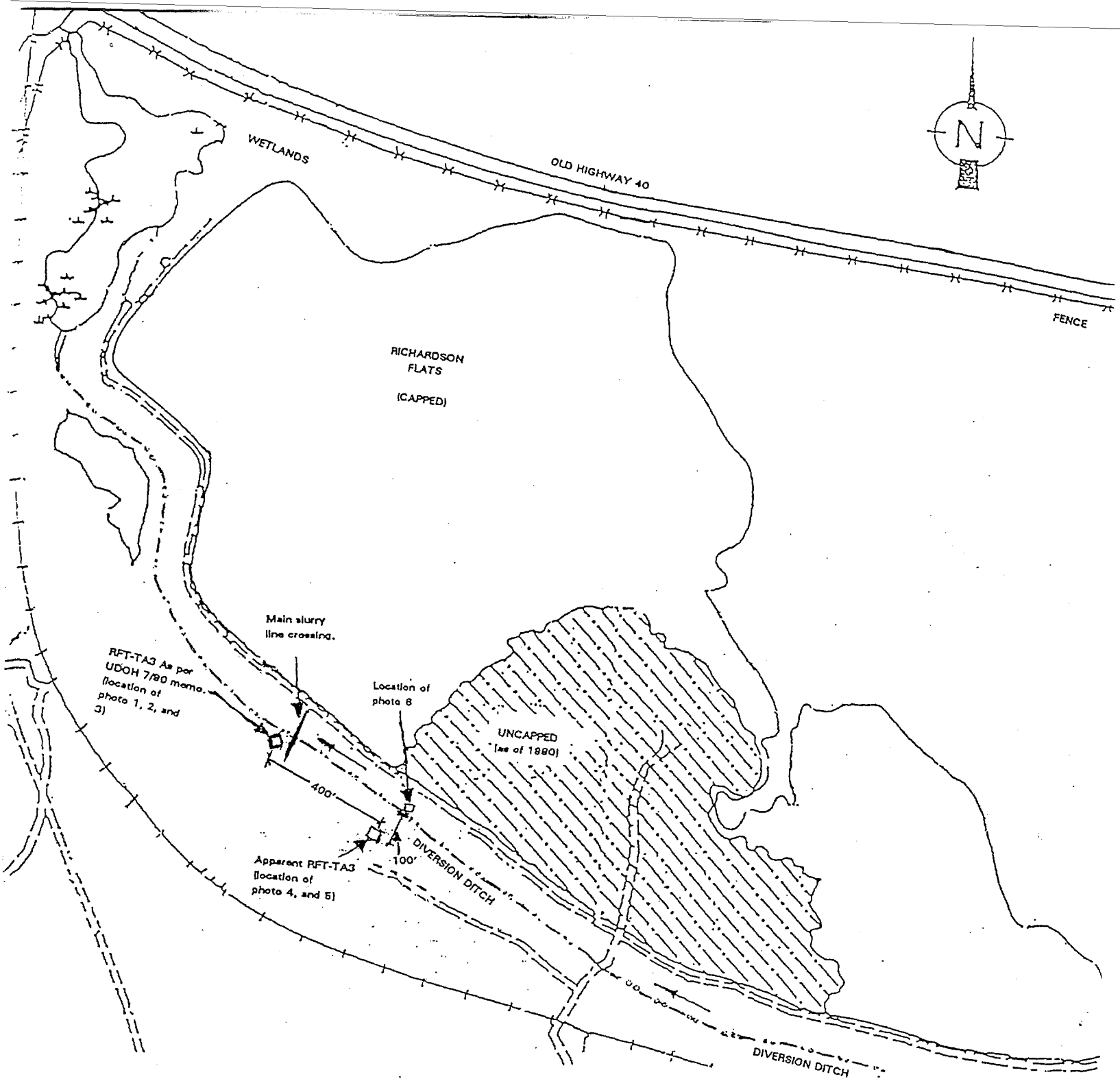
During and following the sampling and analysis McCeney photo documented the crossing area and the apparent location of RFT-TA3. McCeney paced and compassed the apparent location of RFT-TA3 as being approximately 100 feet southerly from the diversion ditch. McCeney observed that tailings material was present in an area surrounding the sample location (see photos # 4,5, and 6). Some fill activity had taken place north of the sample location, in an area extending to the diversion ditch. However, McCeney observed that, in places, tailings were mixed with the fill. McCeney also observed tailings mixed with the fill on the south bank of the diversion ditch. McCeney and Zimmerman observed that this mixture of tailings and fill extended into the standing water of the diversion ditch. (see photo #6).

McCeney and Zimmerman left the site to return to Denver at approximately 1515 hrs on August 5. On August 6 at 1045 hrs Osika informed Keen that UPCM legal counsel objected to TAT collecting soil samples at the diversion crossing. Osika stated that his reason for objecting was that collection of these samples for the expressed purpose of addressing UPCM's comments to the HRS was beyond the scope of the approved sampling plan for this site visit. Osika further stated that he would not object to EPA collecting samples for this purpose contingent upon EPA developing a sampling plan which provides the stated purpose of addressing comments to the HRS package. TAT did not collect soil samples at the slurry line crossing of the diversion ditch.

ATTACHMENTS:

A. Photos
B. Figure 1: Site Map

cc: Greg Oberley, 8HWM-SM
Rick Baird, 8ORC
Mo Slam, UDEQ
Scott Keen, TAT
Ed Osika, UPCM



Environmental Protection Agency		FIGURE 1
Title: Richardson Flats Park City, Utah		
Date: 8/24/92	By: CGW	Scale: 1" ≈ 380' 1:4530

PHOTO #1
DIRECTION: S87°E
SUBJECT: Slurry line diversion ditch crossing. TAT member is analyzing sample RF-051 using X-MET XRF instrument. XRF reading 0.0 ppm "Relative Total Lead Concentration".
DATE: August 5, 1992 **TIME:** 1436 hrs
PHOTOGRAPHER: Mike McCeney
WITNESS: Mike Zimmerman

PHOTO #2
DIRECTION: S87°E
SUBJECT: Slurry line diversion ditch crossing. TAT member is analyzing sample RF-053. XRF reading 6326 ppm "Relative Total Lead Concentration". Note stake on north side a ditch for proposed sample location.
DATE: August 5, 1992 **TIME:** 1445 hrs
PHOTOGRAPHER: Mike McCeney
WITNESS: Mike Zimmerman

PHOTO #3
DIRECTION: Southery
SUBJECT: Looking southerly from diversion ditch crossing.
DATE: August 5, 1992 **TIME:** 1505 hrs
PHOTOGRAPHER: Mike McCeney
WITNESS: N/A

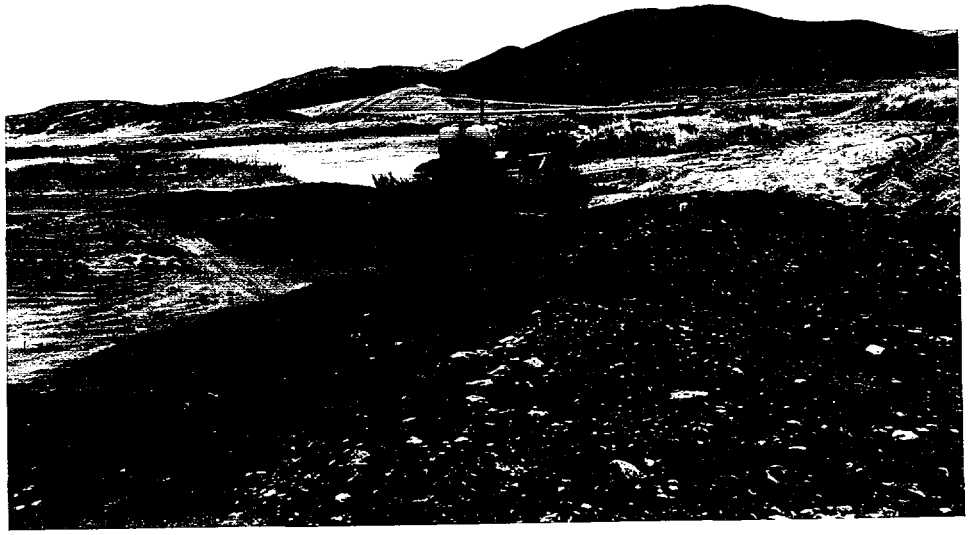


PHOTO #4
DIRECTION: S25°W
SUBJECT: Apparent location of RFT-TA3 (from 1990 SSI). Sample was taken immediately north of bulldozer.
DATA: August 5, 1992 **TIME:** 1448 hrs
PHOTOGRAPHER: Mike McCeney
WITNESS: Ed Osika

PHOTO #5
DIRECTION: N23°E
SUBJECT: Apparent location of RFT-TA3. Facing toward diversion ditch. Note thin cover material (dark soil) on top of tailings (grey material).
DATE: August 5, 1992 **TIME:** 1500 hrs
PHOTOGRAPHER: Mike McCeney
WITNESS: Ed Osika (in background)

PHOTO #6
DIRECTION: S23°W
SUBJECT: From north bank of diversion ditch toward apparent location of RFT-TA3. Note tailings mixed with fill on south bank of diversion ditch.
DATE: August 5, 1992 **TIME:** 1507 hrs
PHOTOGRAPHER: Mike McCeney
WITNESS: N/A

EPA REGION VIII
SUPERFUND DOCUMENT MANAGEMENT SYSTEM

DOC ID # 7095
PAGE # _____

IMAGERY COVER SHEET
UNSCANNABLE ITEM

Contact the Superfund Records Center to view this document.

SITE NAME Richardson Flat Tailings

OPERABLE UNIT _____

REPORT OR DOCUMENT TITLE Site Visit

DATE OF DOCUMENT August 25, 1992

DESCRIPTION OF IMAGERY Color Photos

NUMBER AND TYPE OF IMAGERY ITEM(S) 6 Photos